

PTC

02 FEB 2004

107523674

## INTERNATIONAL SEARCH REPORT

International application No.

PCT/US03/27447

## A. CLASSIFICATION OF SUBJECT MATTER

IPC(7) : G06F 9/44, 15/163

US CL : 717/107,709/310

According to International Patent Classification (IPC) or to both national classification and IPC

## B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

U.S. : 717/101-103,107-109, 709/310

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched  
Microsoft Computer DictionaryElectronic data base consulted during the international search (name of data base and, where practicable, search terms used)  
SafariBooksOnline.com, ACM, East (USPAT; US-PGPUB; EPO; JPO; DERWENT; IBM\_TDB)

## C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	US 6,189,138 B1 (FOWLOW et al.) 13 February 2001 (13.02.2001), column 3 line 13 - column 4 line 64, column 7 lines 61-67, Figure 5	1-7, 13, 28-34
Y, P	US 2003/0046661 A1 (FARBER et al.) 06 March 2003 (06.03.2003), Page 8 paragraph 94	1-7, 28-34
Y	US 6,083,276 (DAVIDSON et al.) 04 July 2000 (04.07.2000), column 1 line 49 - column 2 line 12, column 6 lines 50-58	2, 5, 6
Y	Microsoft Computer Dictionary, May 2002, Microsoft Press, pp. 179, 264, 397, 578-580	7, 14-27
X	US 5,325,533 (MCINERNEY et al.) 28 June 1994 (28.06.1994), column 3 lines 6-8 and 22-24, column 21 lines 31-46, Figures 12-14	8-11
Y		13
Y	US 6,170,081 B1 (FONTANA et al.) 02 January 2001 (02.01.2001), column 2 lines 1-7 and 33-35, column 4 lines 35-37, column 6 lines 38-44, column 8 lines 9-11, Figures 2, 4, and 5	14-27
Y	US 6,381,743 B1 (MUTSHCLER, III) 30 April 2002 (30.04.2002), column 7 lines 22 - column 8 line 50	18-21, 24-27



Further documents are listed in the continuation of Box C.



See patent family annex.

\* Special categories of cited documents:

"A" document defining the general state of the art which is not considered to be of particular relevance

"E" earlier application or patent published on or after the international filing date

"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)

"O" document referring to an oral disclosure, use, exhibition or other means

"P" document published prior to the international filing date but later than the priority date claimed

"T"

later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

"X"

document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

"Y"

document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art

"&amp;"

document member of the same patent family

Date of the actual completion of the international search

21 January 2004 (21.01.2004)

Date of mailing of the international search report

12 FEB 2004

Name and mailing address of the ISA/US

Mail Stop PCT, Attn: ISA/US  
Commissioner for Patents  
P.O. Box 1450  
Alexandria, Virginia 22313-1450

Facsimile No. (703) 305-3230

Authorized officer

Tuan Q. Dam

Telephone No. (703)305-3900

## INTERNATIONAL SEARCH REPORT

## C. (Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y, T	US 6,640,255 B1 (SNYDER et al.) 28 October 2003 (28.10.2003), column 16 lines 23-34	22
A	US 6,167,563 (FONTANA et al.) 26 December 2000 (26.12.2000)	1-34
A	US 6,510,550 B1 (HIGHTOWER et al.) 21 January 2003 (21.01.2003)	1-34
A	DASHOFY et al., An Infrastructure for the Rapid Development of XML-based Architecture Description Languages, May 2002, ACM, ICSE '02 Proceedings, pp. 266-276	1-34
A	VAN DER VLIST, E., Using W3C XML Schema, 17 October 2001 (17.10.2001), O'Reilly & Associates, XML.com, Online: < <a href="http://www.xml.com/pub/a/2000/11/29/schemas/part1.html">http://www.xml.com/pub/a/2000/11/29/schemas/part1.html</a> >	1-34
A	RAMBHIA, A.M., XML Distributed Systems Design, 04 March 2002 (04.03.2002), Sams Publishing, ISBN 0-672-32328-1, Chapter 7	1-34
A, O	BRODSKY, S.A., XMI: The Value of Interchange, 5 February 1999 (05.02.1999), OMG XMI Briefing	1-34
A, O	IYENGAR, S., Overview of XMI, 5 February 1999 (05.02.1999), OMG XMI Briefing	1-34
A, O	SOLEY, R.M., XMI Standardization: OMG's Role, 5 February 1999 (05.02.1999), OMG XMI Briefing	1-34
A, O	IYENGAR AND BRODSKY, XML Metadata Interchange (XMI), 16 September 1998 (16.09.1998), Proposal to OA & DTF RFP	1-34

# INTERNATIONAL SEARCH REPORT

International application No.

PCT/US03/27447

## Box I Observations where certain claims were found unsearchable (Continuation of Item 1 of first sheet)

This international report has not been established in respect of certain claims under Article 17(2)(a) for the following reasons:

1. ☒ Claim Nos.: 12  
because they relate to subject matter not required to be searched by this Authority, namely:  
Claim 12 refers to an "unlimited number of intermediate positions" in lines 2 and 3. It is impossible for the display of a finite script to have an unlimited number of intermediate positions.
2. ☐ Claim Nos.:  
because they relate to parts of the international application that do not comply with the prescribed requirements to such an extent that no meaningful international search can be carried out, specifically:
3. ☐ Claim Nos.:  
because they are dependent claims and are not drafted in accordance with the second and third sentences of Rule 6.4(a).

## Box II Observations where unity of invention is lacking (Continuation of Item 2 of first sheet)

This International Searching Authority found multiple inventions in this international application, as follows:

1. ☐ As all required additional search fees were timely paid by the applicant, this international search report covers all searchable claims.
2. ☐ As all searchable claims could be searched without effort justifying an additional fee, this Authority did not invite payment of any additional fee.
3. ☐ As only some of the required additional search fees were timely paid by the applicant, this international search report covers only those claims for which fees were paid, specifically claims Nos.:
4. ☐ No required additional search fees were timely paid by the applicant. Consequently, this international search report is restricted to the invention first mentioned in the claims; it is covered by claims Nos.:

Remark on Protest

☐  
☐

The additional search fees were accompanied by the applicant's protest.

No protest accompanied the payment of additional search fees.